# Agenda

# **CERES Science Team Meeting**

### Pearl Young Theater, Building 2102 NASA Langley Research Center, Hampton, VA May 5-7, 2015

#### **Major Objectives for the Meeting:**

- 1. Review status of CERES Instruments and Data Products:
  - Status of CERES
  - CERES Terra, Aqua and S-NPP SW/LW/TOTAL Channel Calibration Update
  - CERES FM6 and RBI Update
  - MODIS & VIIRS Cloud Algorithm & Validation Status
  - ADM, SOFA, SARB and TISA Working Group Reports
  - FLASHFLUX Update
  - EBAF Update
  - Data Management Team Update: Terra/Aqua/S-NPP
  - Atmospheric Sciences Data Center (ASDC) Update
  - CERES Communication Activities
- 2. *Invited Presentations Session:* On the creation & improvement of key ancillary datasets used to generate CERES Earth radiation budget climate data records:
  - Aerosol retrievals from MODIS & VIIRS
  - GMAO reanalysis data
- 3. Contributed Science Reports. Each report is 20 min including time for questions.

**Meeting Minutes: PDF** 

We plan to publish the minutes of the meeting electronically, so please send an electronic copy of your presentation to Ed Kizer (edward.a.kizer@nasa.gov) either before or following the meeting. Desired format is a pdf document.

Dutch Treat Dinner: 6:30 pm Tuesday Evening (Venue: Baci Italiano Ristorante. Peninsula Town Center, Kilgore Ave., Hampton)

Tuesday, May 5
NASA Langley Research Center, Hampton, VA

## **CERES Technical Session**

8:00 am	Registration at Badge and Pass Office	
8:55 am	Welcome/Meeting Logistics	N. Loeb
9:00 am	State of CERES	N. Loeb
9:30 am	CERES FM1-FM6 Instrument Update	K. Priestley/ S. Thomas
10:15 am	Break	
10:45 am	CERES Clouds Working Group Report	P. Minnis
11:15 am	CERES Angular Distribution Model (ADM) Working Group Report	W. Su
11:45 am	Status of the SOFA Validation and TSI Measurements	D. Kratz
12:05 pm	Lunch	
1:35 pm	Surface Atmospheric Radiation Budget (SARB) Working Group Update	S. Kato
2:05 pm	Time Interpolation and Spatial Averaging (TISA) Working Group Report	D. Doelling
2:35 pm	CERES Fast Longwave and Shortwave Fluxes (FLASHFLUX) Update	P. Stackhouse
2:55 pm	CERES Energy Balanced and Filled (EBAF) Edition4 Plans	N. Loeb
3:15 pm	Break	
3:45 pm	CERES Data Management Team (DMT) Working Group Report	J. Gleason
4:15 pm	Atmospheric Sciences Data Center (ASDC) Update	J. Kusterer
4:35 pm	CERES Education and Outreach Overview	S. Crecelius
4:55 pm	Adjourn	

# Wednesday, May 6 NASA Langley Research Center, Hampton, VA

#### **Contributed Science Presentations**

8:30 am	Correction of directional effects of incident radiation on ocean surface emissivity for CERES longwave irradiance computations	SH. Ham
8:50 am	A global database of spectral surface emissivity for the entire longwave spectrum: development, validation, and application	X. Huang
9:10 am	Diurnal differences in OLR climatologies and anomaly time series	J. Susskind
9:30 am	A study of GERB shortwave calibration evolution: a cross-comparison study with CERES	R. Parfitt
9:50 am	ERBS tilted nonscanner update	T. Wong
10:10 am	Break	
10:40 am	Using CERES data to constrain climate sensitivity	A. Dessler
11:00 am	Constraining climate model ensemble projections using radiation process-oriented performance metrics	N. Baker
11:20 am	The role of DYNAMO observations in improving GMAO reanalysis and CERES-like surface atmosphere radiation estimation	H. Wang
11:40 am	Evaluation of MERRA using CERES EBAF	L. Hinkelman
12:00 pm	Lunch	
	<b>Invited Science Presentations</b>	
1:30 pm	Introduction	N. Loeb
1:40 pm	Creating a consistent aerosol optical depth record from MODIS and VIIRS	R. Levy
2:25 pm	Status of GMAO Reanalysis and Future Plans	M. Bosilovich
3:10 pm	Break	
3:40 pm	Day-night differences in AIRS version-6 water vapor	J. Susskind

3:55 pm	MERRA-2/AIRS/MODIS Temperature/Humidity Comparisons	S. Kato/F. Rose
4:15 pm	Discussion and Next Steps	
	<b>Contributed Science Presentations</b>	
4:35 pm	SARB aerosol datasets-assimilation of Terra MODIS, Aqua MODIS and NPP VIIRS MODIS- Like AOD	D. Fillmore
4:55 pm	Global warming, tropical expansion and ENSO in OLR-a QC benchmark exercise	HT. Lee
5:15 pm	On the sensitivity of the diurnal cycle in the Amazon to convective intensity	K. Itterly
5:35 pm	Adjourn	

Thursday, May 7
NASA Langley Research Center, Hampton, VA

## **Contributed Science Presentations (Cont'd)**

8:30 am	A New Parameterization of Ice Cloud Radiative Properties	P. Yang/Minnis
8:50 am	New global estimates of cloud ice and liquid water path from MODIS using a profiling method	W.L. Smith
9:10 am	Build 3D Cloud Properties with A-Train C3M Data	S. Sun-Mack
9:30 am	The capabilities of lidar datasets for radiative heating rate and flux calculations	T. Thorsen
9:50 am	A CERES-Consistent Cloud Property Climate Data Record Using AVHRR Data: Version 1 Delivery Results	C. Bedka
10:10 am	Break	
<b>10:10 am</b> 10:40 am	Break A Radiation Closure Study of Arctic Cloud Properties	X. Dong
	A Radiation Closure Study of Arctic Cloud	X. Dong P. Taylor
10:40 am	A Radiation Closure Study of Arctic Cloud Properties  The influence of sea ice on Arctic low cloud	J
10:40 am 11:00 am	A Radiation Closure Study of Arctic Cloud Properties  The influence of sea ice on Arctic low cloud properties and radiative effects  Evaluation of the Arctic Radiation Budget in CMIP5	P. Taylor